

## United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION O.
09/497,554	02/03/2000	Cory Attra	03150-P0001A	7650
7590 06/02/2004		EXAMINER		
Wesley W Whitmyer Jr			VIG, NARESH	
St. Onge Stewa	rd Johnston & Reens LLC			
986 Bedford Street			ART UNIT	PAPER NUMBER
Stamford, CT 06905-5619			3629	

DATE MAILED: 06/02/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

#### UNITED STATES PATENT AND TRADEMARK OFFICE



COMMISSIONER FOR PATENTS
UNITED STATES PATENT AND TRADEMARK OFFICE
P.O. BOX 1450
ALEXANDRIA, VA 22313-1450
www.usplo.gov

MAILED

JUN 02 2004

GROUP 3600

# BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

Paper No. 14

Application Number: 09/497,554 Filing Date: February 03, 2000 Appellant(s): ATTRA ET AL.

Wesley W. Whitmyer, Jr. (Registration No. 33,558)
For Appellant

**EXAMINER'S ANSWER** 

This is in response to the appeal brief filed 05 March 2004.

## (1) Real Party in Interest

A statement identifying the real party in interest is contained in the brief.

## (2) Related Appeals and Interferences

A statement identifying the related appeals and interferences which will directly affect or be directly affected by or have a bearing on the decision in the pending appeal is contained in the brief.

#### (3) Status of Claims

The statement of the status of the claims contained in the brief is correct.

#### (4) Status of Amendments After Final

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

## (5) Summary of Invention

The summary of invention contained in the brief is correct.

#### (6) Issues

The appellant's statement of the issues in the brief is correct.

## (7) Grouping of Claims

Appellant's brief includes a statement that claims 1 - 26 do not stand or fall together and provides reasons as set forth in 37 CFR 1.192(c)(7) and (c)(8).

Examiner Answer is based on the assumption that the dependent claims fall with the independent claims.

## (8) Claims Appealed

The copy of the appealed claims contained in the Appendix to the brief is correct.

#### (9) Prior Art of Record

Information on Residential Design Provider Collective Designs

(www.collectivedesigns.com)

Information on Building Supply Provider ChooChoo Build-it Mart

(www.choochoobuilditmart.com)

Gwen Lowery, "Managing Projects With Microsoft Project 4.0 For Windows (TM) and

Macintosh (R)"

Information on APmatics

## (10) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claim Rejections - 35 USC § 103

Application/Control Number: 09/497,554 Page 4

Art Unit: 3629

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1 – 7, 12 – 15, 23 – 25 are unpatentable under 35 U.S.C. 103(a) over Collective Designs hereinafter known as CollectiveDesigns in view of Apmatics.

Regarding claims 1 and 12 – 13, CollectiveDesigns discloses a system and method for providing home plans over the internet. CollectiveDesigns website states that "Collective Designs features along with it's own inventory, a collection of home plans from leading architects and designers though-out the United States and Canada. Here you'll find new and exciting home designs as well as the finest selection of time-proven stock plans from across North America." To find a home design at the CollectiveDesigns website, customer submits a query with their selection criteria (access Home Plan Search web page). CollectiveDesigns displays the list of selected home designs that meet customer's selection criteria. Customer can select a home design from the list to get additional information on the design. CollectiveDesigns discloses that that its design plans include

- Detailed Floor Plan
- Electrical Layout
- Foundation Plan

Application/Control Number: 09/497,554

Art Unit: 3629

- Exterior Elevations
- Interior Elevations
- Building Sections and Construction Details
- Some but not all Roof Plan
- Customers may also select additional options:
  - Additional sets of plans
  - Mirror reversed
  - Study prints "

In addition CollectiveDesigns discloses that customers can make revisions to the design plans. CollectiveDesigns states that "For a small fee you can add a room, change the exterior design, add more or less square foot, etc. If you are interested in making revisions to a particular plan just send us your modification via e-mail." [page 4]. It would have been obvious to a person with ordinary skill in the art that CollectiveDesigns has system and method to alter their design to meet customer preferences and modifications.

CollectiveDesigns discloses to provide Materials List which details the quantities, type and size of materials need to build home [page 23].

CollectiveDesigns does not disclose modifying the drawings on a computer. It is known at the time of invention to a person with ordinary skill in the art that CAD programs were available to create drawings (e.g. AutoCAD, Visio etc.). APmatics discloses system and method to add command functions which automate or otherwise facilitate tasks requiring numerous steps using standard CAD commands, prepared to suit the specific requirements of a company that employs computer drafting. APmatics makes available readily downloadable and custom, made-to-order CAD command and

drawing management applications. APmatics states that "Simplifying routinely performed cumbersome tasks results in savings of time, reduced fatigue, and more effective use of your computer's capabilities towards improved productivity".

Therefore, it would have been obvious to a person with ordinary skill in the art to modify CollectiveDesigns as taught by APMatics and use computer as taught by APMatics to create or modify drawings of CollectiveDesigns to simplify the drawing process, save cost etc.

Regarding claim 2, CollectiveDesigns website states that "Collective Designs features along with it's own inventory, a collection of home plans from leading architects and designers though-out the United States and Canada. Here you'll find new and exciting home designs as well as the finest selection of time-proven stock plans from across North America." [page 2] To find a home design at the CollectiveDesigns website, customer submits a query with their selection criteria (access Home Plan Search web page). CollectiveDesigns displays the list of selected home designs that meet customer's selection criteria. Customer can select a home design from the list to get additional information on the design.

CollectiveDesigns does not disclose using database. However, it would have been obvious at the time of invention to a person with ordinary skill in the art to use a file system like a indexed files, database etc. to manage data and make the data easier to retrieve. Therefore, it would have been obvious to one of ordinary skill in the art at the

time the invention was made to modify CollectiveDesigns and use database for storing information for allowing the users to allow the users to extract data they desire.

Regarding claim 3, CollectiveDesigns discloses to offer plurality of home designs to their customers [page 12]. CollectiveDesigns states that "For a small fee you can add a room, change the exterior design, add more or less square foot, etc. If you are interested in making revisions to a particular plan just send us your modification via e-mail." (design based on customer requirements) [page 4].

Regarding claim 4, CollectiveDesigns teaches queries relating to user's lifestyles and fundamental needs wherein scope of summary comprises a user profile from which the system (CollectiveDesigns) generates (presents) a home plan [pave 10].

Regarding claim 5, CollectiveDesigns discloses to provide home plan specifications and details [pages 18 – 20].

Regarding claims 6-7, 14-15, CollectiveDesigns discloses that it provides Materials List for the plan [page 23]. Their materials list "details the quantity, type and

size of materials needed to build your home. (This list is helpful in acquiring an accurate construction estimate.)". CollectiveDesigns does not disclose that it will do project management for the customer. However, Collective design suggests that its customers can hire a general contractor to manage the project. "For a new home, a general contractor (GC) will usually pay off in numerous ways. The GC will plan the project, hire competent subcontractors, avoid costly errors, and save the homeowner lots of time".

Therefore, it is known at the time of invention to a person with ordinary skill in the art to provide project management services to their customers to generate additional revenue.

Regarding claim 23, CollectiveDesigns does not disclose using database.

However, it would have been obvious to a person with ordinary skill in the art to use a file system like a indexed files, database etc. with CollectiveDesigns to manage data and make the data easier to retrieve.

CollectiveDesigns does not disclose to authenticate the user. However, it is known at the time of invention to a person with ordinary skill in the art to use user authentication with CollectiveDesigns to protect user privacy, prevent unauthorized use of the information on the system etc., for example, online banking, online stock trading authenticate users prior to allowing the to use their system for making transactions.

CollectiveDesigns discloses that it provides Materials List for the plan. Their materials list "details the quantity, type and size of materials needed to build your home. (This list is helpful in acquiring an accurate construction estimate.)". Customers can make revisions to the design plans. CollectiveDesigns states that "For a small fee you can add a room, change the exterior design, add more or less square foot, etc. If you are interested in making revisions to a particular plan just send us your modification via e-mail." [page 4].

CollectiveDesigns discloses to provide Materials List which details the quantities, type and size of materials need to build home [page 23].

CollectiveDesigns does not disclose modifying the drawings on a computer. However, it is known at the time of invention to a person with ordinary skill in the art that CAD programs were available to create drawings (e.g. AutoCAD, Visio etc.). APmatics discloses system and method to add command functions which automate or otherwise facilitate tasks requiring numerous steps using standard CAD commands, prepared to suit the specific requirements of a company that employs computer drafting. APmatics makes available readily downloadable and custom, made-to-order CAD command and drawing management applications. APmatics states that "Simplifying routinely performed cumbersome tasks results in savings of time, reduced fatigue, and more effective use of your computer's capabilities towards improved productivity".

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify CollectiveDesigns as taught by APMatics and

use computer to create or modify drawings of CollectiveDesigns to simplify the drawing process, save cost etc.

Regarding claims 24 – 25, CollectiveDesigns discloses that it provides Materials List for the plan [page 23]. Their materials list "details the quantity, type and size of materials needed to build your home. (This list is helpful in acquiring an accurate construction estimate.)". CollectiveDesigns does not disclose that it will do project management for the customer. However, Collective design suggests that its customers can hire a general contractor to manage the project. "For a new home, a general contractor (GC) will usually pay off in numerous ways. The GC will plan the project, hire competent subcontractors, avoid costly errors, and save the homeowner lots of time" [page 5].

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify CollectiveDesigns in view of APMatics and provide project management services to their customers (provide general contractors to customers) to generate additional revenue.

Claims 8 – 11, 16 – 19 and 26 are rejected under 35 U.S.C. 103(a) as being unpatentable over Collective Designs hereinafter known as CollectiveDesigns in view of

APMatics as applied to claim 1 - 7, 12 - 15, 23 - 25 above, and further in view Choo-Choo Build-It Mart hereinafter known as ChooChoo.

Regarding claim 8 and 16, CollectiveDesigns in view of APMatics does not disclose to prepare an estimate. However, ChooChoo disclose a system and method to sell building material over the internet. ChooChoo offers estimates on projects. In addition ChooChoo discloses to have online quotes and orders. ChooChoo gives pricing confirmation via phone or email to their customers.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify CollectiveDesigns in view of APMatics as taught by ChooChoo and provide estimates to customers to help them in arranging for financing to start the project.

Regarding claims 9 – 11 and 17 – 19, CollectiveDesigns system and method allows the customer to retrieve and view home plans over the internet.

CollectiveDesigns does not disclose that it will do project planning for the customer. However, Collective design suggests that its customers can hire a general contractor to manage the project. "For a new home, a general contractor (GC) will usually pay off in numerous ways. The GC will plan the project, hire competent subcontractors, avoid costly errors, and save the homeowner lots of time". The GC keeps the owner (customer) informed about the progress of the construction project to

keep them updated and also to help them arrange for upcoming payments (construction loans have funds disbursed to borrower during construction). It is known at the time of invention to a person with ordinary skill in the art that project managers create project plans to manage the projects (Microsoft Project is one of the software that project managers can use to track resources, timeline, costs etc.). Updated project plans can be electronically provided to the responsible team members to show the current status of the project.

Therefore, it is known at the time of invention to a person with ordinary skill in the art to modify CollectiveDesigns in view of APMatics and provide project planning services to their customers to help them save cost (for example, if the rough in plumbing is not completed, a project manager will delay pouring concrete for the foundation).

Neither CollectiveDesigns in view of APMatics nor ChooChoo disclose to have video camera at the construction. However, it is known at the time of invention to a person with ordinary skill in the art that video surveillance has been in use for security reasons (for example, banks have video camera installed in their branches for surveillance).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify CollectiveDesigns in view of APMatics and ChooChoo and install video camera at the construction site to monitor progress and prevent theft.

Regarding claim 26, CollectiveDesigns does not disclose to prepare an estimate. However, ChooChoo disclose a system and method to sell building material over the internet. ChooChoo offers estimates on projects. In addition ChooChoo discloses to have online quotes and orders. ChooChoo gives pricing confirmation via phone or email to their customers.

Page 13

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify CollectiveDesigns in view of APMatics at taught by ChooChoo and provide estimates to customers to help them in arranging for financing to start the project.

Claims 20 – 22 are unpatentable under 35 U.S.C. 103(a) over Collective Designs hereinafter known as CollectiveDesigns in view of Gwen Lowery.

Regarding claims 20 – 22, CollectiveDesigns discloses a system and method for providing home plans over the internet. CollectiveDesigns website states that "Collective Designs features along with it's own inventory a collection of home plans from leading architects and designers though-out the United States and Canada. Here you'll find new and exciting home designs as well as the finest selection of time-proven stock plans from across North America." To find a home design at the CollectiveDesigns website, customer submits a query with their selection criteria (access Home Plan

Search web page). CollectiveDesigns displays the list of selected home designs that meet customer's selection criteria. Customer can select a home design from the list to get additional information on the design.

CollectiveDesigns does not disclose creating project plans for the project, and showing dependencies between the tasks. However, Glen Lowery discloses that Microsoft Project can be used to keep track of project information. Project Manager (general contractor) enters list of task and available resources, and, assigns resources to the tasks in Microsoft Project to create a project plan. Tasks can be independent, or, they can be linked to create dependency (next task will begin after the completion of preceding task). Project Manager updates the project plan by updating the progress of each task. Project Manager can look at the Tracking Gantt chart to compare "current schedule to the original schedule after the project is under way and you (project manager) have entered information about progress on tasks (sample on page 23 of the book, attached)". In addition, Glen Lowery says that the PERT Chart (available on Microsoft Project) show each task with the lines between them indicating the relationship between the task. "Use the PERT Chart to see the dependencies between the tasks in your project".

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify CollectiveDesigns as taught by Gwen Lowery and use project management software in CollectiveDesigns to expand their business in construction services and have the current project status readily available for the

customer (for example, when a customer gets a construction loan, banks may make the loan payments based upon the milestone).

Neither CollectiveDesigns nor Gwen Lowery disclose to have video camera at the construction. Howerver, It is notoriously known that video surveillance has been in use for security reasons (for example, banks have video camera installed in their branches for surveillance).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify CollectiveDesigns in view of Gwen Lowery and install video camera at the construction site to monitor progress and prevent theft.

#### (11) Response to Argument

In response to appellant's argument that neither CollectiveDesigns nor APMatics discloses, teaches, or suggests software for <u>creating</u> a home plan or a modified home plan <u>based upon received responses or requests from users</u>, is not found to be persuasive in view of . Appellant discloses creating home plan as querying for a floor plan [see application, Fig. 1]. CollectiveDesign teaches to query for a floor plan [page 10], and, CollectiveDesign teaches to provide modified home plan based upon received requests from users (users send modification via email) [page 4].

In response to appellant's argument that neither reference discloses, teaches, or suggests software executing on the computer for performing work package calculations, which are a breakdown of all components to design and construct a home, is not found to be persuasive in view of CollectiveDesigns. CollectiveDesigns inherently / obviously performs work package calculation to provide breakdown of all components (Material List) to design and construct a home [page 23].

In response to appellant's argument that neither CollectiveDesigns nor APMatics discloses, teaches, or suggests software for <u>creating</u> a home plan or a modified home plan <u>based upon received responses or requests from users</u>, is not found to be persuasive in view of CollectiveDesigns. CollectiveDesign teaches to query for a floor plan [page 10], and, CollectiveDesign teaches to provide modified home plan based upon received requests from users (users send modification via email) [page 4].

In response to appellant's argument that neither reference discloses, teaches, or suggests software executing on the computer for performing work package calculations, which are a breakdown of all components to design and construct a home, is not found to be persuasive in view of CollectiveDesigns. CollectiveDesigns inherently / obviously perform work package calculation to provide breakdown of all components (Material List) to design and construct a home [page 23].

In response to appellant's argument that APMatics discloses that it makes available readily downloadable and custom, made-to-order CAD command and drawing management applications [page 1]." However Appellant fails to see how this assertion, even if completely accurate, is relevant in any way, is not found to be persuasive in view of . APMatics explicitly teaches that digital images can also be sent between users. For example, to avoid duplication of effort, a customer can use APMatics to make modifications to the drawings and send the modification in the electronic format to the other home designer for calculating building material for the modified design.

In response to appellant's argument that CollectiveDesign relates to a website that provides a user with access to a database of already created home plans. The user may search for a plan by a variety of criteria, such as square footage, number of bedrooms, number of bathrooms, and other specifications. In response to the user submitted search criteria, the website sends any plan or plans matching the search criteria. However, no home plans are created. The home plans sent to the user are not created in response to the search criteria. The home plans of CollectiveDesigns were created before being stored on the database and are not created after receiving search criteria. Hence, these home plans on CollectiveDesigns are not customized, as they are in Appellant's invention, where home plans are <u>created</u> or <u>modified</u> in response to user inputted information, is not found to be persuasive in view of CollectiveDesigns and APMatics.

CollectiveDesign teaches that users can send modifications (customization) via email. CollectiveDesign in view of APMatics teaches that design can be created using CAD/CAM and exchanged between users. Therefore, CollectiveDesign in view of APMatics teaches specification based model (as disclosed by appellant in application Fig. 4) for creation of designs using a computer system.

Page 18

In response to appellant's argument that CollectiveDesigns does not disclose, teach, or suggest software for performing work package calculations on the home plan to create a breakdown of all components to design and construct a home, is not found to be persuasive in view of CollectiveDesigns. CollectiveDesigns inherently / obviously teach to perform calculations to home plane to be able to provide material list.

In response appellant's argument that a combination of APMatics would provide the ability to use the CollectiveDesigns website with ease by combining several steps together into something similar to a macro. Because no home plans were created or modified in response to user inputted information, combining the teachings of APMatics would also not provide Appellant's claimed invention, is not found to be persuasive in view of CollectiveDesigns and APMatics. APMatics is a CAD which is used by engineers to design a product (e.g. a home). Therefore, APMatics can be used by a user to design a product they desire (should the user desire to design a home, they can use APMatics to design a home).

In response to appellant's argument that there is no indication that it was the CollectiveDesigns software which created such lists (material list), is not found to be persuasive in view of CollectiveDesigns. It is known to one of ordinary skill in the art at the time invention was made that computer tools like MS Excel, Lotus 123 etc. can be used to create material lists. To automate a manual process, one of ordinary skill in the art could have used a computer to create a list.

In response to appellant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, CollectiveDesigns teaches that customers can purchase home designs over the internet and they customize the home designs by communicating with CollectiveDesigns via Email over the communication network like internet. APMatics teaches that a CAD like software can be used to allow users to create and modify designs.

In response to appellant's argument that in CollectiveDesigns, the home plan is a manually created plan that is simply in a computer displayable format. The home plans were not created by the software, as are plans in the present invention (see arguments

Application/Control Number: 09/497,554

Art Unit: 3629

presented above). Because the home plans were manually created, Appellant submits that it would be extremely difficult, if not impossible, for the modifications to be automatically carried out by software. This is not a case where it would be a simple matter to automate a step of a prior art process. In order to arrive at the present invention, one skilled in the art would first have to develop a system by which home plans could be created by software in the first place, and then recognize that the modification process could be automated. As such, Appellant respectfully submits that *In re Venner is* not applicable, is not found to be persuasive in view of CollectiveDesigns and APmatics.

APMatics teaches that designs can be created and modified using a CAD software. Appellant's argument suggests that they have a proprietary version of CAD like software to generate a design like a floor plan for the user. Therefore, one of ordinary skill in the art can modify CollectiveDesign and merge it with a readily available software like APMatics to store the designs in an electronic format which can be modified based upon user requested changes.

In response to appellant's argument that there is no teaching of a database of subscriber home plans and the retrieval of a subscriber home plan from the database based upon a subscriber identification. The purpose for such a database is to allow home plans created by the system to be easily and automatically recalled and/or modified during remodeling or reconstruction, is not found to be persuasive in view of CollectiveDesigns. CollectiveDesigns inherently / obviously teaches a database of

subscriber home plans and the retrieval of a subscriber home plan from the database based upon a subscriber identification (customer can query home plans from CollectiveDesign system).

In response to appellant's argument that Lowery does not disclose, teach, or suggest that software performs any of these steps without user intervention (i.e. Lowery teaches a manual process), is not found to be persuasive in view of CollectiveDesigns in view of Lowery.

Appellant does not disclose how the update of a construction progress is acquired without manually entering the status somewhere in the system. It is known at the time of invention to one of ordinary skill in the art that data is projects plans are manually updated to reflect the current state of the project. For example, roof trusses are installed, and half of the plywood for the roofing is installed. It is not clear from appellant's disclosure how is this data entered into the appellant's invention. Also, it is known to one of ordinary skill in the art the tools like MS Project as taught by Lowery can get the input from the computer system to generate gantt chart (not manually entered in to the MS Project's project plan).

In response to appellant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the

Application/Control Number: 09/497,554

Art Unit: 3629

references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992), is not found to be persuasive in view of . In this case, CollectiveDesigns teaches that customers can purchase home designs over the internet and they customize the home designs by communicating with CollectiveDesigns via Email over the communication network like internet. Lowery teaches that tools like MS Project can be used for project management. It is known to one of ordinary skill in the art that tools like MS Project, MS Excel, Lotus 123 can read the data from the computer system to generate results (without manually entering the data).

In response to appellant's argument that to automate the manual project management process only makes sense if the home plan which forms the basis of the construction plan was created by the software. Otherwise, it would be extremely difficult if not impossible (and certainly not obvious) for software to create the construction plan. However, it is known to one of ordinary skill in the art at the time invention was made that project plans are based on past experiences and estimate time and resources required to complete a task is entered in to the system to generate a preliminary plan. As the project progresses, the plan is adjusted accordingly to accommodate any delays or early completion of task. For example, a person or system cannot predict weeks in advance that there will be heavy rain during the digging of the basement which will delay the project by few days. Therefore, the preliminary project plan will have number

Application/Control Number: 09/497,554

Art Unit: 3629

of days required to complete the task in an ideal situation. Therefore, one of ordinary skill in the art at the time of invention may modify CollectiveDesigns and provide preliminary project plan to the user.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

Naresh Vig June 1, 2004

Conferees

Wesley W Whitmyer Jr St. Onge Steward Johnston & Reens LLC 986 Bedford Street Stamford, CT 06905-5619 Page 23